



# Founding team and start-up competitive advantage

Competitive  
advantage

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## Abstract

**Purpose** – The purpose of this paper is to develop a framework to link founding team and start-up competitive advantage in the context of the Taiwanese technology-based ventures.

**Design/methodology/approach** – The paper analyzes 211 start-ups in the technology-based sector and verifies the relationship between entrepreneur resources, trust, founding team partners' commitments, and start-up competitive advantage.

**Findings** – In technology-based start-ups, the competitive advantage of a start-up is determined by the founding team partners' commitments and the resources that an entrepreneur possesses.

**Research limitations/implications** – The study is retrospective, which relies on technology-based founding team members as the primary research subjects. Some respondents may observe the performance of their start-ups today and then make attributions about the past to explain that performance.

**Practical implications** – Utilization of personal networks is important in the early stage of technology-based start-ups; through networking and using trust, an entrepreneur can gain the critical resources and competitive advantage required in the development of a business.

**Originality/value** – In technology-based start-ups, trust, not the resources that an entrepreneur possesses, is an effective way for entrepreneurs to win founding team partners' commitment.

**Keywords** Entrepreneurialism, Competitive advantage, Taiwan

**Paper type** Research paper

## I. Introduction

Many of the previous researches in entrepreneurship attach more attention to entrepreneurs. They attempt to relate traits of entrepreneurs to new venture creation, but they have failed to demonstrate a definitive linkage. Founding teams, which are comprised of entrepreneurs themselves and founding team partners, are becoming one of the more popular and important modes of new business developments (Chandler *et al.*, 2005; Lasch *et al.*, 2007; Watson *et al.*, 2003). Recently, technology-based start-ups have emerged as an important yet insufficiently understood area of enquiry (Garcia-Morales *et al.*, 2007; Rae, 2006). In this paper, an entrepreneur represents the lead entrepreneur, who initiated the formation of a start-up, and founding team



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partners refer to other founding team members. To technology-based start-ups, the founding team partners often play a key role as important as entrepreneurs.

It is generally acknowledged that new firms, especially new technology-based firms (NTBFs), greatly contribute to the static and dynamic efficiency of the economic system (Colombo and Grilli, 2005). Research indicates however, that the probability of survival is rather limited for new organizations in general, and for NTBFs in particular (Aspelund *et al.*, 2005). Though some research identifies influencing factors of the survival or success of NTBFs, such as the initial resources (Aspelund *et al.*, 2005) and founders' human capital (Colombo and Grilli, 2005), less attention has been directed on human resources issues including those that pertain to the executive team (Balkin and Swift, 2006). From a viewpoint of human resources management, Balkin and Swift (2006) argue that the compensation of the top management team plays an important role for technology ventures. This study proposes that, in addition to the human resources view, there are more influencing factors remain unexplored. For example, the future success probability of NTBFs, and team members' trust to the entrepreneur may play very important roles to attract the commitment of founding team members. This study intends to contribute the literatures with deepen understandings of the success and survival of NTBFs.

A technology-based entrepreneur usually uses his personal network to recruit founding team partners in Taiwan (Yu *et al.*, 2003). Founding team members jointly found and operate new ventures. This study follows the social capital theory (Binks *et al.*, 2006; Lin *et al.*, 2006; Mosey *et al.*, 2006; Nahapiet and Ghoshal, 1998) intending to identify the causes of founding team partners' commitments to the lead entrepreneur, whether trust (which is based on previous relationship and affection between an entrepreneur and founding team partners) or entrepreneur resources (such as specialized know-how, capital, managerial capability and start-up experience which will produce profit in the future) or both (which is more important).

The resources of a start-up are defined as the stock of available resources that are owned by the lead entrepreneur and combined with the complementary or important resources provided by founding team partners. Accumulation and integration of these resources generate competitive advantages of a start-up. This study also follows the resource-based view (RBV) (Barney, 1991; Hadjimanolis, 2000; James, 2002; Kristandl and Bontis, 2007; Ray *et al.*, 2004; Wu, 2007) intending to examine the relationship between entrepreneur resources and start-up competitive advantage, and the relationship between founding team partners' commitments and start-up competitive advantage.

In sum, this paper analyzes how founding team and start-up competitive advantage are related, and develops a framework to link entrepreneur resources, trust, founding team partners' commitments, and start-up competitive advantage in the context of the Taiwanese technology-based ventures.

This study focuses on the Taiwanese NTBFs for two reasons. First, as the third largest IT producing country in the world, Taiwan's information technology (subsequently referred to as IT) industry is a key player in the global market for high-tech products. Secondly, Taiwanese IT industry is famous for its prosperity of entrepreneurship activities (Wu *et al.*, 2008).

We have organized the paper as follows: after the introduction, Section II reviews the literature and develops research hypotheses; Section III describes the research methodology; Section IV discusses the empirical results; and Section V concludes the paper.

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## II. Literature review and hypotheses

To explain the variation in competitive advantage among entrepreneurial firms, this study used two guiding theories: the resource-based view of the firm and social capital theory.

### *Resource-based view*

The resource-based view (RBV) can be attributed to Penrose (1959), who proposed that sustained firm growth is based on internal firm characteristics, such as management capability and economies of scale of technological expertise. Only when Wernerfelt (1984) proposed the concept of resource position barrier did scholars begin to consider that sustainable competitive advantage derives from differentiated firm resources. RBV holds that, rather than continuously adjusting firm operating category to fit environmental changes, a better strategy is the sustained construction of core resources; enterprises with abundant resources can then survive and grow owing to their competitive advantages, regardless of external environmental changes. Strategically valuable core resources should possess tacitness, complexity, exclusivity, the inability to be rapidly accumulated, and the characteristic of being “valuable, rare, and inimitable” (Barney, 1991), thus preventing them from being easily acquired by other companies.

### *Social capital theory*

Organizations depend on their environment to provide resources (Pfeffer and Salancik, 1978). Social capital theory suggests that firm internal and external networks contribute significantly to firm performance. Western scholars discussing networks generally stress inter-firm networks, which they frequently term business networks; moreover, business networks that include both firm upstream and downstream relations are often labeled production networks (Yu, 2000). Interpersonal relationships are the main concern when considering the network relations of Asian firms. Network relationship management depends on trust (Powell, 1990) and network relations facilitate the development of trust (Hite, 2005). Individuals are the nodes that mesh interpersonal networks together, and the ties between them can be affectively or economically oriented (Chang and Tan, 1999). For example, Hite (2003) identified three components of embedded network ties: personal relationships, dyadic economic interaction, and social capital. Different combinations of these three components suggested a classification typology of seven types of embeddedness.

### *Hypotheses*

The major ideas of social capital theory fits well the Taiwanese NTBFs. For example, Saxenian's (1994) and Yu *et al.*'s (2003) studies of Chinese entrepreneurs discovered that affective factors are important elements in the formation of start-ups by Chinese entrepreneurs, regardless of whether they are in the Silicon Valley or Taiwan's Hsinchu High-tech Science-based Industrial Park. Owing to previous relationships and affection based on entrepreneurs, these founding team partners are willing to provide not only resources and abilities but also have confidence about the positive future of start-ups that start-ups really need, and according the social capital theory, this is called affective oriented commitment. In order to effectively manage the affective oriented tie, trust is very important (Powell, 1990). The foundation of trust between

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entrepreneurs and partners of the funding teams is normally based on previous relationship and affection between them (Dyer and Chu, 2000; Gulati, 1998).

In accordance with the theory of the trust and commitment (Morgan and Hunt, 1994), we consider trust as a precursor of commitment. Because commitment involves potential vulnerability and sacrifice, it follows that people are unlikely to be committed unless trust already is established (Garbarino and Johnson, 1999). Therefore, trust is a major determinant of commitment (Morgan and Hunt, 1994).

Join in technology-based start-ups, founding team members take greater risk than in traditional industries because of the industry environment is more unstable. That is, their investment is under higher vulnerability. Therefore, it is important for an entrepreneur to use his personal network to invite founding team members to join in the start-up (Bruderl and Preisendorfer, 1998; Dubini and Aldrich, 1991), because trust in the personal network can make investors feel safer, and thereby more willing to contribute to the start-up. That is, the strong ties/friendships that the founding team partners have with the entrepreneur make them to trust the entrepreneur, join the new venture and devote most of their resources, abilities, and time to the entrepreneur and new venture. Therefore, according the theories of social capital, we propose:

*H1.* In technology-based start-ups, the higher the trust of the founding team partners for the entrepreneur, the greater their commitments for cooperation.

In addition to affective oriented commitment, founding team partners' commitments may also include an objective oriented connection. This is because these cooperative partners believe that cooperation with the entrepreneur will be profitable (Hite, 2000; Laumann, 1982). Therefore, another incentive for founding team partners to cooperate with the entrepreneur is the profit factor (i.e. the potential for monetary gains).

Founding team partners hope that, by cooperating with the entrepreneur, they will be able to receive substantial economic rewards in the future. Many technology-based entrepreneurs come from engineering backgrounds (in this study, 93.6 percent of surveyed entrepreneurs had engineering backgrounds) and have technical expertise, relevant work history (Starr and MacMillan, 1990), managerial ability (Bruno and Tyebjee, 1985), or start-up experience (Sandberg and Hofer, 1987). These can be regarded as the entrepreneur's own resources. Founding team partners assess the amount of entrepreneurs' resources and then cooperate with those who have abundant resources with the anticipation of future profits (Hite, 2000; Laumann, 1982). A rational evaluation of the economic benefits to be received following the cooperation is an important factor for the founding team partners in considering whether to devote most of their time and resources with an entrepreneur or to a start-up. When the entrepreneur has more resources, it is more probable that the star-up will be profitable, and therefore the founding team partners will gained more return on their investments and commitments. In other words, firm economic trust (Hite, 2003) or calculative trust (Rousseau *et al.*, 1998) in the focal firm increase with increasing resources. That is, in addition to the traditional propositions of RBV of the firm, this study propose the combination of RBV and social capital theory and argue that commitments of founding team members increased because of more resources of the entrepreneur. Therefore, we propose:

*H2.* In technology-based start-ups, the more resources the entrepreneur has, the greater the commitments for cooperation among the founding team partners.

Owing to commitments, founding team partners are willing to not only provide resources and abilities but also have confidence about the positive future of start-ups, which are necessary for the start-up to thrive. Without doubts, the accumulation of resources plays a key role in determining the success of a start-up. These views endorse the resource-based view on firm performance (Barney, 1991; Kristandl and Bontis, 2007; Ray *et al.*, 2004; Wu, 2007); namely, entrepreneurial resources determine entrepreneurial successes.

The resources of a start-up are defined as the stock of available resources that are owned by an entrepreneur and combined with the complementary or important resources provided by the founding team partners. Integration of these resources generates competitive advantages of a start-up. When integrating resources of others, trust reduces transaction costs by reducing or eliminating both *ex ante* and *ex post* opportunism (Zaheer and Venkataraman, 1995) and coordination costs (Gulati and Singh, 1998), thus enhancing firm competitive advantage. This study proposes that promoting commitments of founding team partners can enhance competitive advantage of the start-up, because a committed team member is more willing to contribute (such as the organizational citizenship behavior), easier to communicate and coordinate, and exhibit less opportunism.

Therefore, according to the main spirits of social capital theory, greater commitments of founding team members bring more resources in to the firm, which can be combined with the entrepreneur resources. And according to RBV, the more resources will lead to the greater competitive advantage of the firm. We then propose the following two hypotheses:

- H3.* In technology-based start-ups, the more resources the entrepreneur has, the higher the competitive advantage of the start-up.
- H4.* In technology-based start-ups, the greater the commitments for cooperation among the founding team partners, the higher the competitive advantage of the start-up.

### III. Methodology

#### *Sampling and respondents*

Founding team members of the technology-based firms located in the Taipei-Hsinchu areas, Taiwan, were chosen as the object for this study. Since many questions in the questionnaire traced back to the time when a firm was founded, only the members of a founding team are appropriate respondents (Ganesan, 1994).

Before distributing the questionnaires, firms were contacted by phone to identify one founding team member in each firm. After confirmation, subjects were contacted to request their help in answering the questionnaires. After mailing the questionnaires, the respondents were followed up by researchers to ascertain their receipt of the questionnaires, and were urged to quickly return the completed questionnaires (see Sivadas and Dwyer, 2000).

A total of 1,200 firms were randomly sampled from 2,000 firms listed in the sampling frame. Of the 2,000 questionnaires distributed, 14 were returned because of incorrect addresses, and 217 responses were obtained from the 1,186 firms that received questionnaires. Six of the returned questionnaires had too many missing values and thus were considered invalid. The final number of respondents was 211,

representing a valid return rate of 17.58 percent. The composition of the responding firms was judged to be sufficiently diverse. Breaking down the sample according to respondent firm industries, 28.2 percent were involved in computers and peripherals, 18.3 percent were involved in integrated circuits, 16.4 percent in communications, 12.1 percent in software, 8.4 percent in precision machinery, 7.6 percent in optoelectronics, 5.3 percent in biotechnology, and 3.7 percent in other products. This distribution among different industries is similar to that of the sampling frame.

To confirm that the respondent firms were representative of the general population, ANOVAs were employed to check for differences between early and late respondents (Armstrong and Overton, 1977). Responses returned within four weeks of the first mailing were classified as early ( $n = 148$ ), while those received after four weeks were classified as late ( $n = 63$ ). The ANOVAs were performed against the null hypothesis that mean annual turnover sales and employee numbers do not differ between the early and late responding groups. The hypothesis was not rejected. These two groups did not differ significantly in terms of any of the two measures (for annual turnover sales:  $p = 0.917$ ; for number of employees:  $p = 0.892$ ).

### *Measures*

*Entrepreneur resources.* Entrepreneur resources indicate an entrepreneur's own resources and capabilities. Similar to other studies, this study adopted the following four variables to measure entrepreneur resources: specialized know-how (Amit and Schoemaker, 1993); financial capital (Tsai and Ghoshal, 1998); managerial capability (Collis, 1991); and an entrepreneur's experience which includes the entrepreneur's work experience (Bruderl and Preisendorfer, 1998) and start-up experience (Sandberg and Hofer, 1987). Respondents were asked to assess the resources of the entrepreneur subjectively on a seven-point semantic-differential scale (see Table I).

*Founding team partners' commitments.* This study developed the following four items to measure founding team partners' commitments: "You are willing to work under the lead entrepreneur's leadership"; "You are willing to devote most of your time to the company"; "You are willing to contribute most of your resources and abilities to the company"; "You are not willing to leave the company easily". Respondents were asked to subjectively assess founding team partners' commitments on the lead entrepreneurs on five-point Likert scales (from strongly agree to strongly disagree).

*Trust.* This study asked the respondents to subjectively assess, on five-point Likert scales (from strongly agree to strongly disagree), founding team partners' trust on the lead entrepreneurs. This study adopted the following five items to measure trust (Johanson and Grayson, 2005; Gounaris, 2005): "You will tell the lead entrepreneur all of the problems you encountered"; "You can predict the lead entrepreneur's behavior"; "You believe that the lead entrepreneur will not cheat on you"; "You believe that the lead entrepreneur will not take advantage of you"; "You are very friendly with the lead entrepreneur".

*Start-up competitive advantage.* The competitive advantage of a start-up was measured by the following four items: speed in responding to the market (Hill and Jones, 2007; Hoyt *et al.*, 2007); production efficiency (Hill and Jones, 2007; Pisano and Wheelwright, 1995); product quality (Hill and Jones, 2007; Lee *et al.*, 2001); and, innovation speed (Hill and Jones, 2007). Respondents were asked to assess the competitive advantage on a seven-point semantic-differential scale.



Constructs	Scale	Measurement item	Factor loading	Standard error	t-value
Entrepreneur resources <sup>b</sup>	7 point SD	1. Specialized know-how (outdated-cutting edge)			
		2. Financial capital (scant-abundant)			
		3. Managerial capacity (scarce-excellent)			
		4. Start-up experience (scant-extensive)			
Founding team partners' commitments ( $\alpha = 0.8345$ )	5 point Lkt	1. You are willing to work under the lead entrepreneur's leadership	0.72	0.08	8.66
		2. You are willing to devote most of your time to the company	0.82	0.08	10.35
		3. You are willing to contribute most of your resources and abilities to the company	0.91	0.07	12.13
		4. You are not willing to leave the company easily <sup>a</sup>			
Trust ( $\alpha = 0.8396$ )	5 point Lkt	1. You will tell the lead entrepreneur all of the problems you encountered			
		2. You can predict the lead entrepreneur's behavior <sup>a</sup>	0.89	0.08	11.74
		3. You believe that the lead entrepreneur will not cheat on you	0.90	0.08	11.87
		4. You believe that the lead entrepreneur will not take advantage of you	0.65	0.09	7.22
		5. You are very friendly with the lead entrepreneur			
Start-up competitive advantage ( $\alpha = 0.8615$ )	7 point SD	1. Speed in responding to the market firm direction (lower than the industry average-higher than the industry average) <sup>a</sup>			
		2. Production efficiency (lower than the industry average – higher than the industry average)	0.58	0.09	6.62
		3. Product quality (lower than the industry average – higher than the industry average)	0.79	0.08	9.81
		4. Innovation speed (lower than the industry average – higher than the industry average)	0.96	0.08	11.96

**Notes:** <sup>a</sup> Item dropped because of loading on two constructs; <sup>b</sup> Formative construct, CFA not applicable; SD = Semantic-differential scale; Lkt = Likert scale

**Table I.**  
Measurements and scales

A CFA was used to test the adequacy of the measurement model. We estimated the proposed measurement model using LISREL 8.72. The adequacy of the measurement models was evaluated by the overall fit with the data, convergent validity, discriminate validity, and reliability. The results indicate reasonable overall fits between the model and the observed data. Among the four constructs, apart from the entrepreneur resources, which is a formative concept, the other three constructs are all reflective concepts. A CFA was applied to establish the construct validity (Bollen, 1989). The overall fit of the measurement model was  $\chi^2_{(115)} = 144.9$ ,  $p = 0.18$ , GFI = 0.95, AGFI = 0.91, RMSEA = 0.039, NFI = 0.95, TLI = 0.98, CFI = 0.99. These results demonstrated that the data were reasonably fitted with the model (Bollen, 1989; Hair *et al.*, 2006).

According to Anderson and Gerbing (1988), convergent validity can be assessed by determining whether each indicator's estimated coefficient on its proposed underlying construct is significant (greater than twice of its standard error). An examination of the indicator loadings (except for entrepreneur resources, which is a formative construct) indicated that all factors loadings for individual indicator were significant (see Table I). An inspection of the values of Cronbach's alpha (see Table I) revealed that all of the three were greater than 0.80, indicating acceptable reliability (Hair *et al.*, 2006). These results provided supports for the unidimensionality of the scales.

The most common test of discriminate validity is that the confidence interval around the correlation between any two latent constructs does not include 1 (Smith and Barclay, 1997). None of the correlations between latent constructs for the CFA model reached 1. A more conservative test of discriminate validity involves comparing the values of models that either free or constrain (to a value of 1) the phi value and testing whether the constraint causes a significant decrease in fit (Bagozzi *et al.*, 1992). Again in all cases, the overall fits of the models were significantly diminished by constraining the correlation to 1. Therefore, we concluded that discriminate validity is adequate for the measurement model.

#### *Analytical techniques*

Following Anderson and Gerbing (1988), the hypotheses were tested using a two-stage structural equation model. First, we performed a confirmatory factor analysis (CFA) to evaluate construct validity regarding convergent and discriminate validity. In the second stage, we performed a path analysis for hypotheses testing.

Though according Hu and Bentlers (1995) proposed that to apply structural equation modeling requires sample size of 250 or more, the path-analytic procedure has become popular for studies where a small sample size restricts the use of full structural equation models (Chaudhuri and Holbrook, 2001; Li and Calantone, 1998). An equal weight approach was applied to determine the construct scores. The individually calculated construct numbers were displaced with mean numbers to simplify the model and make it more parsimonious (Babin and Boles, 1998).

#### **IV. Results and discussions**

The overall disposition of the path analysis model fit indexes, including  $\chi^2_{(1)} = 0.51$ ,  $p = 0.47$ , GFI = 1.00, AGFI = 0.98, RMSEA = 0.00, NFI = 0.99, TLI = 1.04, and CFI = 1.00 revealed that the model was acceptable. Among the four hypotheses, three are supported (see Table II).



**Table II.**  
Testing results

Causal path	Hypothesis	Path coefficient	<i>t</i> -value
Trust → Founding team partners' commitments	<i>H1</i>	0.84 *	8.36
Entrepreneur resources → Founding team partners' commitments	<i>H2</i>	0.02	0.45
Entrepreneur resources → Start-up competitive advantage	<i>H3</i>	0.31 *	3.58
Founding team partners' commitments → Start-up competitive advantage	<i>H4</i>	0.62 *	3.97

Notes: \*  $p < 0.05$

Three hypotheses gained support and they are: *H1* ( $\beta = 0.84$ ,  $t$ -value = 8.36); *H3* ( $\beta = 0.31$ ,  $t$ -value = 3.58); and *H4* ( $\beta = 0.62$ ,  $t$ -value = 3.97). One hypothesis, *H2* ( $\beta = 0.02$ ,  $t$ -value = 0.45), was not supported by the empirical results. The primary factors influencing the competitive advantage of a technology-based start-up are the resources of an entrepreneur and founding team partners' commitments. This reveals that an entrepreneur's own resources and capabilities are critical for a technology-based start-up. In addition, the personal network of an entrepreneur, which relies on the trust built between an entrepreneur and his acquaintances, is not only helpful in recruiting founding team partners but also in acquiring supplement or important resources to enhance the competitive advantage of a start-up.

However, entrepreneur resources are found to be unrelated to founding team partners' commitments. This implies that the relationships and affection between founding team partners and entrepreneurs are the most important factors affecting their decisions to join and devote to start-ups. At the same time, this signifies that trust is more important than resources (i.e. economic benefits) to founding team partners. Two plausible reasons for this phenomenon are:

- (1) even though an entrepreneur has plenty of resources (such as specialized know-how, capital, managerial capability and start-up experience), this does not guarantee the success of a start-up (e.g. Nesheim (2000) indicated that the odds of success of a start-up is only six in a million); and
- (2) even though an entrepreneur has plenty of resources and a start-up is likely to make profits in the future, the founding team partners still take into account the moral hazards deriving from the fear that the entrepreneur may deliberately cheat on them, especially significant under the not well-developed institutional context in developing countries such as Taiwan (Khanna and Palepu, 1997).

## V. Conclusions

This study combines RBV and social capital theories to explain the competitiveness of technology-based start-ups. Specifically, focusing on the importance of founding team members, this study argues that resources of and the trust gained by the entrepreneur will enhance the commitment of founding team members, which will further contribute to the competitive advantage of NTBFs.

In technology-based start-ups, trust is an effective way by which entrepreneurs can win founding team partners' commitments. Accordingly, utilizing this key element helps technology-based start-ups not only acquire key resources but also indirectly

increases their competitive advantage. Although the resources of an entrepreneur are not the major cause influencing the commitments of start-up team partners to cooperate, it is an important factor influencing the competitive advantage of a start-up. Therefore, trust and actual resources (such as the resources of an entrepreneur) are crucial factors for start-ups to achieve success and sustain growth. Furthermore, the building up of a start-up's resources and the competitive advantage of a start-up can be achieved through cultivating an entrepreneur's personal network.

With regard to the suggestions for the operation of technology-based start-ups, this study offers two directions: the first is how to win the support of founding team partners; and the second is how to enhance the competitive advantage of start-ups. One's own effort is not sufficient for venture activities, and, most often, it is necessary for founding team partners to provide important or complementary resources. Thus, how to increase the cooperative commitments of venture team partners for start-ups is crucial. This study found that the trust that founding team partners have for the entrepreneur is instrumental to increase their commitments for cooperation. Consequently, close friends and relatives, before a start-up was inaugurated, may become the partners of the start-up. Therefore, utilization of personal networks is important in the early stage of technology-based start-ups; through networking and using trust, an entrepreneur can gain the critical resources and abilities required in the development of a business.

#### *Limitations and further research*

It is not suggested to over generalize the results of this study because it is based data from only one country. Though Taiwanese firms do play a major role in the global IT industry, more diversified country samples are needed to further justify the research findings of this study.

Because this study is retrospective which relies on technology-based founding team members as the primary research subjects, some respondents may observe the performance of their start-ups today and then make attributions about the past to explain that performance. To reduce this source of bias, researchers could design longitudinal studies so that network data is captured in one time period and related to performance in a subsequent time period. They also can reduce this source of bias by collecting performance data from a different respondent.

This study is primarily based on perceptual data. This approach makes it difficult for management to determine appropriate actions based on the study results (Wang *et al.*, 2004). Despite the extensive employment of such data in strategy research, future studies can consider to adopt hard data. Also, the study focuses on technology-based firms. However, technology-based firms differ from sub-industry. For example, manufacturers differ from service firms, and hardware firms differ from software firms. Consequently, start-up competitive advantage is likely to differ from the mentioned sub-industries. This topic also deserves further investigation.

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#### **Further reading**

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